



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER OF PATENTS AND TRADEMARKS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/468,639	12/22/1999	TOYOSHI KAWADA	1081.1084/JD	3873

21171 7590 05/09/2003

STAAS & HALSEY LLP  
700 11TH STREET, NW  
SUITE 500  
WASHINGTON, DC 20001

EXAMINER

LIANG, REGINA

ART UNIT	PAPER NUMBER
----------	--------------

2674

DATE MAILED: 05/09/2003

24

Please find below and/or attached an Office communication concerning this application or proceeding.

B

# Office Action Summary

Application No.

09/468,639

Applicant(s)

KAWADA ET AL.

Examiner

Regina Liang

Art Unit

2674



-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 07 April 2003.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1,3-14,16-24,26 and 27 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1, 3-14, 16-24, 26, 27 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

## Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

## Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) \_\_\_\_\_.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

### DETAILED ACTION

1. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

### *Claim Rejections - 35 USC § 102*

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(a) the invention was known or used by others in this country, or patented or described in a printed publication in this or a foreign country, before the invention thereof by the applicant for a patent.

3. Claims 1, 3-14, 16-24, 26 are rejected under 35 U.S.C. 102(b) as being anticipated by Andoh et al (US. PAT. NO. 4,044,349 hereinafter Andoh).

Figs. 1, 2 of Andoh discloses a plasma display panel device having first and second electrodes (X and Y electrodes) provided apart from one another and a ground power source, and performing display by generating a discharge between the first and second electrodes, the plasma display panel device comprising a drive circuit (driver 112) applying a drive voltage pulse between the first and second electrodes, the drive circuit connects the first and second electrodes to power sources that are different from the ground power source so as to apply a first drive voltage between the first and second electrodes and when completing the drive voltage pulse, the drive circuit connects the first and second electrodes to power sources that are different from the ground power source so as to apply a second drive voltage between the first and electrodes (see Fig. 4 and col. 5, line 53 to col. 6, line 46). Andoh also discloses the drive circuit that changes the first and second electrodes from a state of being connected to a first or/and second power

Art Unit: 2674

sources different from the ground power source to a state of being connected to a second or/and third or/and fourth power sources different from the ground power source so as to apply a drive voltage between the first and second electrodes when a drive voltage pulse is to be applied between the first and second electrodes.

4. Claims 1, 3-14, 16-24, 26 are rejected under 35 U.S.C. 102(b) as being anticipated by Sakuma (US. PAT. NO. 4,384,287).

Sakuma discloses a plasma display panel device having first and second electrodes (301, 302) provided apart from one another and a ground power source, and performing display by generating a discharge between the first and second electrodes, the plasma display panel device comprising a drive circuit (Fig. 6) applying a drive voltage pulse between the first and second electrodes, the drive circuit connects the first and second electrodes to power sources that are different from the ground power source so as to apply a first drive voltage between the first and second electrodes and when completing the drive voltage pulse, the drive circuit connects the first and second electrodes to power sources that are different from the ground power source so as to apply a second drive voltage between the first and electrodes (see Figs. 6-12 and col. 5, lines 14-45, col. 7, line 11 to col. 8, line 20). Sakuma also discloses the drive circuit that changes the first and second electrodes from a state of being connected to a first or/and second power sources different from the ground power source to a state of being connected to a second or/and third or/and fourth power sources different from the ground power source so as to apply a drive voltage between the first and second electrodes when a drive voltage pulse is to be applied between the first and second electrodes.

5. Claim 27 is rejected under 35 U.S.C. 102(a) as being anticipated by the admitted prior art (Figs. 24A, 24B, and page 2, line 9 to page 4, line 20 of the specification).

The admitted prior art teaches a plasma display panel device having first (X), second (Y) and third (A) electrodes, comprising a drive circuit that when a drive voltage pulse is to be applied between the first and second electrodes, applies the drive voltage pulse between the first and second electrodes, while maintaining the third electrode at a voltage potential of the ground power source, the voltage potential of the ground power source being between voltage potentials of the first electrode and the second electrode (Figs. 24A, 24B of admitted prior art show the GND potential is between +Vs and -Vs).

#### ***Response to Arguments***

6. Applicant's arguments with respect to claims 1, 3-14, 16-24, 26, 27 have been considered but are moot in view of the new ground(s) of rejection.

Applicant's remarks regarding Andoh on pages 6-10 are not persuasive. Again, as shown in Figs. 4A-4D, a driving circuit applies a positive and a negative voltages to X and Y electrodes which reads on the drive circuit applying a drive voltage pulse between the first and second electrodes, the drive circuit connects the first and second electrodes to power sources that are different from the ground power source so as to apply a first drive voltage and a second drive voltage between the first and second electrodes as claimed. Applicant is reading limitations into the claims, the claims only require the voltages be different than the ground level and nothing more. Applicant's remarks in that "Fig. 3 illustrates voltage levels, relative to a "0" voltage

Art Unit: 2674

reference level" are not persuasive, as long as the voltage signals  $V_w$  and  $V_s$  as shown in Fig. 3 have voltage potentials different from the "0" voltage, which reads on the claims. Therefore, Andoh does not constitute a "teaching-away" from applicant's invention.

Applicant's remarks regarding Sakuma on page 8 are not persuasive. Applicant is reading limitations into the claims, the claims only require the applied voltages be different than the ground level. Fig. 7E of Sakuma shows the driving voltages  $+V_o$  and  $-V_o$  are applied to the first and second electrodes and having voltage potentials which are different from 0 voltage, which read on the claims. The same analysis is applicable to the embodiments of Figs. 9-12.

### ***Conclusion***

7. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Art Unit: 2674

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Regina Liang whose telephone number is (703) 305-4719. The examiner can normally be reached on Monday-Friday from 9AM to 5:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Richard Hjerpe, can be reached on (703) 305-4709.

**Any response to this action should be mailed to:**

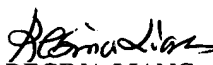
Commissioner of Patents and Trademarks  
Washington, D.C. 20231

**or faxed to:**

(703) 872-9314, (for Technology Center 2600 only)

Hand-delivered responses should be brought to Crystal Park II, 2121 Crystal Drive, Arlington, VA., Sixth Floor (Receptionist).

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Technology Center 2600 Customer Service Office whose telephone number is (703) 306-0377.

  
REGINA LIANG  
PRIMARY EXAMINER  
ART UNIT 2674

RL